140.

Notice of Allowability	Application No.	Applicant(s)
	10/019,336	GAISBERG ET AL.
	Examiner	Art Unit
	Bernard Rojas	2832
The MAILING DATE of this communication appears on the cover sheet with the correspondence address All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.		
1. X This communication is responsive to the amendment filed 7/20/2004.		
2. The allowed claim(s) is/are <u>1-20</u> .		
3. X The drawings filed on 18 December 2001 are accepted by the Examiner.		
4.		
 Attachment(s) 1. ☐ Notice of References Cited (PTO-892) 2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948) 3. ☑ Information Disclosure Statements (PTO-1449 or PTO/SB/O Paper No./Mail Date 12182003 4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material 	6. Interview Summary Paper No./Mail Da 08), 7. Examiner's Amendr	te

DETAILED ACTION

Response to Arguments

Applicant's arguments, see sections 5 and 6 pages 3-8, filed 07/20/04, with respect to the prior art of record discloses biasing springs of equal force have been fully considered and are persuasive. The rejection of claims 1-10 has been withdrawn.

Allowable Subject Matter

Claims 1-20 are allowed.

The following is an examiner's statement of reasons for allowance: The prior art of record does not teach nor suggest, in the claimed combination, an electromagnetic actuator with a pair of springs that possess the same equal total spring energy. Applicant claims the electromagnetic actuator has springs "characterized in that the springs (61, 62) are pre-stressed in such a manner, so that the same energy (A1,A2) is stored in both springs (61, 62) in connection with a compression of the springs (61, 62) that is prescribed by the stroke travel distance (Im) of the armature (1)." As Applicant aptly explained in page 6 paragraph 1 to page 7 paragraph 3;

"it is very important to recognize that ENERSY and FORCE are not the same thing. To the contrary, as a general matter, ENERGY = FORCE x DISTANCE. Thus, in the context of the pre-stressed springs according to Tsuzuki et al. or according to the invention the energy stored in a spring is given by the stressing force multiplied by (i.e. or integrated over) the compression distance of the spring. The distance that a given spring will be compressed by application of a given force depends on the spring constant (or spring characteristic) of that

spring. Thus, two springs having different spring constants will store different amounts of energy when the same force is applied to these two springs."

Page 3

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Bernard Rojas whose telephone number is (571) 272-1998. The examiner can normally be reached on M-F 8-4:00), every other Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Elvin G. Enad can be_reached on (571) 272-1990. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).